



PATENT APPLICATION  
19141-002 CIP CPA (NT-2 CIP CPA)

#26

THE UNITED STATES PATENT AND TRADEMARK OFFICE

Examiner : Bronwen M. Loeb  
Group Art Unit : 1636  
Serial No. : 09/559,707 (Confirmation No.: 2553)  
Applicants : John Greenwood et al.  
Filed: : April 27, 2000  
For : RETINAL CELL LINES WITH EXTENDED LIFE-SPAN  
AND THEIR APPLICATIONS

RECEIVED  
MAY 30 2003  
TECH CENTER 1600/2900

Hon. Commissioner for Patents  
Washington, D.C. 20231

DECLARATION OF WENG TAO UNDER 37 CFR 1.131

1. This declaration is being made to establish invention in the above-identified patent application ("the Application") in the United States under 37 C.F.R. 1.131(b) at a date prior to April 6, 1999, the effective date of U.S. 6,361,771 B1 (the '771 patent) cited by the Examiner in the Office Action dated February 25, 2003.

2. I, Weng Tao, am a named inventor on the Application and on the '771 patent. I developed the modified ARPE-19 cell line which is a feature of both the Application and the '771 patent. Because the modified ARPE-19 cell line was prepared by me prior to the effective filing date of the '771 patent (i.e. April 6, 1999), the '771 patent cannot anticipate this cell line as claimed in the Application.

4. Reduction to practice of the invention described and claimed in at least independent claims 1, 10, and 37 of the Application was diligent.

5. This declaration is submitted with Exhibit A, which consists of laboratory notebook pages demonstrating the possession by me of ARPE-19 comprising an expression vector

Considered  
6/5/03  
22

comprising CNTF, wherein such cell line can non-tumorigenically interact with retinal cells of a mammalian host. This serves as proof of my reduction to practice of this cell line prior to the effective filing date of the '771 patent.

6. I, one of the joint inventors, hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by a fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code, and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

**SIGNATURE:**

Full name of joint inventor: Weng Tao

Inventor's signature: Weng Tao

Date: 5-20-03

NYC 263378v1

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- TEST - 1) WT = ~~WT~~ A
- 2) P544 - 200  $\mu$ m MTR
- 3) P544 - 6418
- 4) P544 A - ALICE 200  $\mu$ m MTR

cell counts count in square

for 300K/3m<sup>6</sup>

- 1) WT 57 = 570,000 cells / mL 526
- 2) P544 200 MTR 32 = 320,000 cells / mL 938
- 3) P544 6418 (0.25 MTR) 53 = 530 K 566
- 4) P544 A 200 MTR 40 = 400 K 750

• dilute cells to 50 K / mL

• add 1.0 mL to one well of 12 well plate

cell counts (count squares)	cells pulsed (h) 1 MTR / F12 10% FCS			
	A	B	C	X
1)	25	36	29	28
2)	30	41	38	36
3)	59	52	42	51
4)	<del>34</del> 34	36	29	33.5

ALICE  
F12  
FCS

Witnessed &amp; Understood by m ,

Dat

Invented by

Dat

Recorded by

50

Book No.

TITLE

ARIE MTR full curve

From Page N 47

cells still OK; since new MTR is not killing, then further would old MTR be good. To further testing I will assume old MTR OK and look for cell death due to MTR resistance.

I will report full curve w/ ↑ MTR (see page 52)

2/4/99 CNTF 20X = diluted  
Results in ng/ml X 20

Samples

 $\bar{x}$ cell #  
(K)

\* output (ng/ml).

Sample	Wells	Values	R	Result	Mean Result	Std. Dev.	CV%
1X01	A3	0.001	R	0.021	0.027	0.007	27.9
	A4	0.002	R	0.032			
1X02	B3	0.001	R	0.021	0.027	0.007	27.9
	B4	0.002	R	0.032			
1X03	C3	0.001	R	0.021	0.027	0.007	27.9
	C4	0.002	R	0.032			
1X04	D3	0.197		2.465	2.404	0.086	3.6
	D4	0.189		2.343			
1X05	E3	0.237		3.121	3.018	0.146	4.8
	E4	0.225		2.915			
1X06	F3	0.224		2.898	2.759	0.198	7.1
	F4	0.207		2.621			
1X07	G3	0.147		1.769	1.766	0.010	0.5
	G4	0.148		1.773			
1X08	H3	0.147		1.759	1.841	0.117	6.3
	H4	0.160		1.924			
1X09	A5	0.101		1.153	1.159	0.009	0.8
	A6	0.102		1.165			
1X10	B5	0.143		1.692	1.672	0.028	1.7
	B6	0.140		1.652			
1X11	C5	0.238		3.139	3.078	0.086	2.8
	C6	0.231		3.017			
1X12	D5	0.193		2.404	2.344	0.085	3.6
	D6	0.184		2.284			
20x01	E5	0.002	R	0.022	0.027	0.007	27.9

0.027

28.3

2.73

36.3

300 ng / ml

1.58

51

124

2.71

33.5

323

(2.36)

(27)

(349)

To Page N

Witnessed &amp; Understood by me,

Date

Investigated by

Date

Recorded by